

[LATCH-UP ANALYSIS AND PARAMETER MODIFICATION]

Abstract

A latch-up analysis and parameter modification system, method and program product that analyzes a circuit design for latch-up sensitivity and allows for modifications of the circuit design to avoid latch-up of the circuit while improving the density and overall performance of the circuit are disclosed. Latch-up of a circuit design is analyzed through identifying an injector source and a collector circuit, at least one of the injector source and the collector circuit having a parameter, providing latch-up criteria for the collector circuit, and determining latch-up sensitivity of the collector circuit based on the latch-up criteria and the parameter. Then, the parameter may be modified to adjust latch-up sensitivity, and latch-up sensitivity of the collector circuit is determined based on the latch-up criteria and the modified parameter.